

Supplementary

Table S1. Metabolites in ethanol extracts from the GL produced by freeze-drying and heat-drying were identified using GC-TOF-MS analysis.

NO.	Compound name	RT (sec)	Freeze-drying (FD)			Heat-drying (HD)		
			FD1	FD2	FD3	HD1	HD2	HD3
1	3-Chlorohexane	188.108	6106123	3779119	4026748	4099644	3994594	3642326
2	Cyclohexane, 2-propenyl-	200.658	503997	295334	295698	313585	320670	350818
3	Trifluoroacetamide, 2TMS derivative	204.600	3380319	2020294	1969645	2122445	2294421	2543599
4	Trisiloxane, octamethyl-	214.258	6370932	3999040	4167736	4193233	4217902	5016121
5	Methylamine, 2TMS derivative	221.392	287927559	176674701	185093751	175396740	185038634	189532680
6	Ethylene glycol, 2TMS derivative	224.233	26711288	16028903	16504767	16920572	17437608	18979239
7	Disiloxane, hexamethyl-2-	226.192	1216157	751113	777863	744110	854025	358399
8	Bromoethanol, TMS derivative	243.067	205720	133798	134463	128364	136753	134194
9	Silanamine, N,N'-methanetetraylbis[1,1,1-trimethyl-	267.883	4079061	2386677	3146979	5248894	5385713	4877802
10	Triisopropylsilane O-	273.183	107967	67134	60169	69163	62142	63133
11	Ethylhydroxylamine, 2TMS derivative	278.125	382034	229392	239234	250766	244680	214116
12	2,2,7,7-Tetramethyl-4-[(trimethylsilyl)methyl]-3,6-dioxo-2,7-disilaoctane	283.708	560752	394420	430608	236122	275645	315396
13	2-Methyl-1,3-propanediol, 2TMS	294.433	120087	57471	80467	71621	87873	67422
14	3-Hydroxypyridine, 1TMS	322.375	967412	703673	902878	384380	398024	653701
15	2-Methyl-1,3-propanediol, 2TMS	323.717	ND	ND	ND	263655	278343	220236
16	Decamethyltetrasiloxane	332.983	192820	139765	144698	141481	163488	174141

17	Dodecane	334.217	334700	230342	232599	186721	213822	232744
18	L-(+)-Lactic acid	336.475	798386	375477	695477	1394181	1282459	1383454
19	Acetic acid, [(trimethylsilyl)oxy]-, trimethylsilyl ester	346.200	1125689	1135210	1360959	993802	1042585	867208
20	L-Valine, TMS derivative	355.775	310726	220268	345563	2357250	1696683	2588930
21	N-Butylamine, DiTMS	361.750	36110	35730	36490	680046	870994	844348
22	L-Alanine	365.325	2307030	1558150	2790486	9036011	8506363	9811471
23	Hexamethyldi siloxane	366.867	219525	143827	224462	222068	136030	189752
24	Hydroxylamine, 3TMS derivative	376.425	11850011	6591775	7119262	7180565	7904158	8855768
25	Bis(trimethylsilyl) oxalate	383.525	298490	228772	302723	651397	547188	479599
26	3-Furoic acid, TMS derivative	388.033	252316	273202	280968	103299	101023	95184
27	Oxalic acid	391.425	1461180	813845	969216	989041	1206821	1060026
28	Ethanamine, 2TMS derivative	401.883	371881	373326	418691	3556442	3923372	3748134
29	Propanoic acid, 2-methyl-3-[(trimethylsilyl)oxy]-, trimethylsilyl ester	402.783	ND	ND	ND	162307	165981	157440
30	Trisiloxane, 1,1,1,5,5,5-hexamethyl-3,3-bis[(trimethylsilyl)oxy]-	410.933	886736	818379	942968	522309	499870	662189
31	L-Proline	415.217	ND	ND	ND	1073775	904660	2061214
32	Ethylbis(trimethylsilyl)amine	420.217	66599	83076	77263	666819	883028	787652
33	3-Hydroxyisovaleric acid, 2TMS derivative	434.267	ND	ND	ND	207477	223921	191848
34	D-Valine	439.383	578122	320870	527240	12864758	12854405	13248695
35	Trisiloxane, 1,1,1,5,5,5-hexamethyl-3,3-bis[(trimethylsilyl)oxy]-	445.542	36618	28582	28041	29805	38838	37739
36	Butanoic acid, 4-	448.733	89075	54806	61895	52449	55180	70071

	[(trimethylsilyl)oxy]-, trimethylsilyl ester							
37	4-Aminobutanoic acid, 3TMS derivative	450.417	393693	247663	254544	259445	273856	309008
38	Diethylene glycol, 2TMS derivative	454.675	463958	400374	336790	138649	76606	200691
39	Trimethylsilyl trimethylsilyl[(trimethylsilyl)oxy]carbamate	455.242	417778	330737	361100	478624	253231	384731
40	L-Serine	464.550	210289	182406	321384	923607	931952	1570730
41	Ethanolamine, 3TMS derivative	470.525	280157	188376	376457	787649	917915	763291
42	L-Norleucine, N-(trimethylsilyl)-, trimethylsilyl ester	472.700	216990	98391	188221	6888075	6228745	5174909
43	Glycerol, 3TMS derivative	472.950	396339	328329	554101	2834418	2794669	2724534
44	Silanol, trimethyl-, phosphate (3:1)	475.608	8330910	7642310	12129903	30100031	28232189	24945931
45	L-Leucine	486.208	274897	145355	257734	6775123	6103178	5393485
46	L-Proline, 1-(trimethylsilyl)-, trimethylsilyl ester	490.150	64357	34390	100494	4911196	4490794	3149354
47	Glycine	494.917	1306964	866635	1769456	6489618	6174197	6072941
48	Succinic acid	495.075	6626719	5533972	8181183	ND	ND	ND
49	Silamine, 1,1,1-trimethyl-N-(trimethylsilyl)-N-[2-[(trimethylsilyl)oxy]ethyl]-	500.658	66277	43441	67533	677825	794162	575741
50	Glyceric acid, 3TMS derivative	506.725	78597	81801	99885	76624	82857	66582
51	Pyrimidine 2,4-bis(trimethylsilyl)oxy -	512.938	ND	ND	ND	690602	727738	594474
52	Butanedioic acid, methylene-,	518.358	159108	119247	140503	150501	138710	136410

	bis(trimethylsilyl) ester							
53	L-Serine	523.325	360119	211909	468113	3760576	3756247	2641038
54	L-Threonine	538.683	193646	110903	186016	1937383	1871415	1543318
	Glycine, N,N-bis(trimethylsilyl)-, trimethylsilyl ester							
55		544.508	2409143	1367364	1483416	1622552	1679379	1674436
	L-Aspartic acid							
56		557.483	70995	58537	70214	152101	92827	290113
	Decanoic acid, trimethylsilyl ester							
57		572.038	120095	129907	177912	ND	ND	ND
	Malic acid, tris(trimethylsilyl) ester							
58		590.617	3083782	3261472	3759915	4321056	4217631	4343423
59	Nonadecane	592.550	160150	116659	123783	82074	104913	127752
60	L-(-)-Arabitol	597.350	31443	27467	30498	50246	52372	42853
	3,8-Dioxa-2,9-disiladecane, 2,2,9,9-tetramethyl-							
61		601.583	94775	49111	61287	126946	128026	123108
	L-Aspartic acid, 3TMS derivative							
62		607.075	723855	496363	647209	2066990	2059797	2054309
	L-Glutamic acid							
63		612.283	15706533	14777306	22395131	11699304	12263252	9388913
	Butanoic acid, 4-[bis(trimethylsilyl)amino]-, trimethylsilyl ester							
64		613.090	534650	702307	869963	9384882	8826742	8749041
	Trimethylsilyl 2,3,4-tris[(trimethylsilyl)oxy]butanoate							
65		620.330	15940	14926	16953	53317	54404	50199
	Pipecolic acid, 2TMS derivative							
66		624.125	1234773	1292245	1888010	908098	1045920	626378
67	L-Proline	640.117	ND	ND	ND	71917	67496	77029
	1-Oxo-1-(trimethylsilyl)-2-propanone							
68		643.760	115153	123455	143897	35826	38868	32785
	3,9-Dioxa-2,10-disilaundecane, 2,2,10,10-tetramethyl-							
69		646.175	894724	781463	1022579	887187	879259	677067
	L-Glutamic acid, 3TMS derivative							
70		653.967	293254	269610	507742	854728	938052	774390
	Phenylalanine, 2TMS derivative							
71		662.317	156707	104625	171877	1357200	1233538	1095703

72	Ethanimidic acid, N-(trimethylsilyl)-, trimethylsilyl ester	670.180	35291	26490	44093	575362	717737	313219
73	L-Asparagine Butanoic acid, 4-	679.717	83626	76672	176963	776561	753189	653060
74	[bis(trimethylsilyl)amino]-, trimethylsilyl ester	695.400	133829	102792	246207	1626982	1371397	1412727
75	L-Rhamnose 2-Desoxy-pentos-3-ulose,	709.058	138278	157322	196984	3043299	3086214	3429851
76	bis(methoxime),O,O'-bis(trimethylsilyl)-Phosphoric acid,	719.192	196070	162666	231083	692354	651946	696915
77	bis(trimethylsilyl) 2,3-bis[(trimethylsilyl)oxy]propyl ester	720.792	537602	329684	435813	507737	682404	724227
78	L-Glutamine, tris(trimethylsilyl) derivative	724.400	792603	618157	1567536	2670285	2738244	1873986
79	Propanoic acid, 2,3-bis[(trimethylsilyl)oxy]-, trimethylsilyl ester	731.117	ND	ND	ND	21849	18204	18971
80	Myo-Inositol 9H-Purine, 9-(trimethylsilyl)-6-	737.233	1817287	2038967	2579830	2497647	3211411	1270948
81	[(trimethylsilyl)oxy]-Citric acid-tetraTMS	742.333	ND	ND	ND	96021	89505	64524
82	Erythrose, MEOX-3TMS	745.183	6811126	6632788	8962139	3945324	3917449	3519911
83	1,5-Anhydrohexitol, 4TMS derivative	751.675	6733409	5804564	9947044	2134134	2846685	2031262
84	Myo-Inositol	760.700	928217	812961	1043472	763195	873058	710604
85	D-(-)-Fructose	767.167	653367	594083	742980	613274	857858	381717
86	Gluconolactone	770.233	703223	771468	885565	1178051	1255440	1140427
87	(3R,4S,5R,6R)-, 4TMS derivative	774.783	279632	182836	203804	452983	326061	330324

88	Silane, tetramethyl-	779.150	48521	55231	57785	ND	ND	ND
89	D-(+)- Mannose	781.567	1224106	1103499	1690244	8845106	8571149	9781764
90	L-Lysine, 4TMS derivative	785.425	178267	150636	231838	1721490	1733239	1438591
91	D-Mannitol Heptasiloxane	794.742	364999	418850	723517	18603914	16410138	14184646
92	hexadecameth yl-	817.300	58815	36120	33408	91968	50661	43791
93	D-Gluconic acid, 6TMS derivative	824.033	39680	51379	72959	1158182	927599	1095300
94	Palmitic Acid, TMS derivative	828.258	2040669	1255283	1636305	1887926	1621963	1802174
95	Inositol	857.492	1999475	1822560	2811621	3461380	3520531	3103439
96	Malic acid, 3TMS derivative	869.058	452862	585705	704306	108093	118552	75948
97	D-Sorbitol	887.150	ND	ND	ND	41194	49400	41309
98	Stearic acid	899.067	1053528	660363	934836	737587	743041	940672
99	D-(-)- Ribofuranose, tetrakis(trimet hylsilyl) ether	938.000	ND	ND	ND	150050	129448	124617
100	Uridine, 3TMS derivative	979.092	687987	288118	295295	896124	1057856	943883
101	Gluconolacton e	1003.500	438260	283629	299786	1054430	345830	299709
102	Inosine, 4TMS derivative (2,3-	1014.340	149674	89185	108685	508799	532008	428299
103	Diphenylcyclo propyl)methyl phenyl sulfoxide	1022.540	640879	363946	416217	481125	451800	415618
104	Uridine, 3TMS derivative	1033.410	625786	429086	493694	1226341	568594	483369
105	Sucrose	1038.580	186334	203265	528541	157634	133772	121714
106	D-(+)- Cellobiose	1058.090	120855	115994	138980	149479	148922	111178
107	Maltose	1065.120	26578	48324	42769	59828	29004	29456
108	D-(+)- Trehalose	1070.190	20233091	18882704	20020118	10380730	13056430	10840066
109	Guanosine, 5TMS derivative	1072.130	ND	ND	ND	311722	292393	232792